



# Brunswick County Health Services

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**Brunswick County Health Department use in preparing the report required pursuant to  
Session Law 2014-120, Section 29.(b).  
Part 1A: On-site Water Protection: Standardize Certain Regulatory Review Procedures  
Reference Session Law 2014-120, Section 29.(b).**

Background: Several types of on-site wastewater applications are submitted to the Brunswick County Health Services On-site Water Protection Section. The review of the applications are limited to ensuring regulatory compliance.

See **Appendix I** for sites/facilities that Brunswick County requested a review to be completed by the NC DHHS, Division of Public Health, Environmental Health Section.

*I. Systems with design daily flows > 3,000 total gallons per day [15A NCAC 18A .1938(e)] or for treatment of industrial process wastewater (IPWW) [15A NCAC 18A .1938(f)]: These type of wastewater systems require State review by the On-Site Water Protection Branch (OSWP).*

**A. Application submittal**

1. Brunswick County Health Services (BCHS) receives an application for a system that requires state review in accordance with Rule .1938(e) or (f) as applicable.
2. BCHS notifies the OSWP of receipt of the application, fills out a request for Review and conveys it to the OSWP with the project submittal.

**B. Optional Initial Meeting:** The owner or their consulting Professional Engineer (PE) may request a meeting with the BCHS and/or OWPS staff to review the preliminary project information based on submittal rules, procedures and requirements.

**C. Soil and Site Evaluation Review**

1. The BCHS Soil Scientist performs a soil/site evaluation. The Licensed Soil Scientist (LSS) may accompany staff if requested. The BCHS soil scientist reviews the submitted soil and site data from the LSS for concurrence and checks any areas where there was not concurrence.
2. Once the BCHS Soil Scientist gathers all applicable information, a report is submitted to the OWPS regional soil scientist for review.
3. BCHS staff waits for review and approval from the OWPS.

#### D. Preliminary Site Plan Review

1. The applicant's PE prepares and submits a preliminary engineer plan showing system location configuration, layout and calculations based upon the LSS report.
2. BCHS Program Specialist reviews the site plan and layout in consultation with the BCHS Soil Scientist. In addition, the program specialist reviews plan details and support documentation.
3. BCHS Program Specialist submits a report/findings to the OWPS Engineer Staff for review.
4. BCHS staff waits for review and approval from the OWPS.

#### E. State Review Approval

1. The OSWP engineer sends a final approval letter to the LHD, the PE and other applicable parties.
2. BCHS issues the Authorization to Construct (AC) Permit upon:
  - a. Receipt of an approval letter and copies of the approved plans and specifications;
  - b. Confirmation that any site modifications required in the IP are complete, inspected or reviewed, and approve by BCHS and/or OSWP [G.S. 130A-336(b)];
  - c. Field verification that the drainfield and repair areas have not been otherwise altered since IP issuance (unless IP/CA are concurrently issued) and reconfirmation that the drainfield layout is acceptable per approved plans;
  - d. Review and approval of legal documentation as necessary, e.g.:
    - (a) Draft tri-party agreement [15A NCAN 18A .1937(h)];
    - (b) Final (recorded) easement agreement(s) and encroachment agreement(s) [15A NCAC 18A .1938(j) and;
  - e. Final (recorded) encroachment agreement(s).

F. Preconstruction Meeting: BCHS conditions the AC to have a pre-construction conference with all participating parties.

G. System Installation: Several site visits are made to review the installation of the on-site wastewater system.

#### H. System Start-Up Inspection

1. The PE and the BCHS determine that construction is complete.
2. The PE, BCHS Staff, Operator (ORC) and (if requested) the OSWP staff engineer and regional soil scientist conduct a system start-up inspection to document baseline performance parameters.
  - a. All parties document any deficiencies in the installation and develop plans to correct them.
  - b. The parties either agree to meet on the site again to document correction of deficiencies or allow the PE to independently oversee correction and provide documentation to that effect.
3. The BCHS issues the Operation Permit (OP) upon:
  - a. Receipt of certifications by all licensed professionals, including record ("as built") drawings if significant changes to the system design occurred during installation [15A NCAC 18A .1938(h)];

- b. Receipt of updated Operation and Maintenance procedures and manual prepared by the PE, incorporating O&M requirements specific to the equipment provided by system component manufacturers [15A NCAC 18A .1939(i)(4)];
- c. Confirmed execution and recordation of all required legal documents [15A NCAC 18A .1937(h), 15A NCAC 18A .1938(j)];
- d. Receipt of a copy of a contract with an operator [15A NCAC 18A .1961(e)] certified by the Water Pollution Control System Operators Certification Commission to operate and maintain this system (G.S. 90A-46) and;
- e. Confirmation that any requirements listed in the IP and CA (or reference in the OSWP approval letter) are complete, inspected or reviewed, and approved by BCHS and/or the OWSP.

II. BCHS Regulatory Review Procedures pursuant to 15A NCAC 18A .1938(f). The review protocol for these types of Regulatory Submittals includes one or more of the activities described above in Section I. The specific type of Regulatory Submittal and associated processes are shown below:

A. Design daily flow review pursuant to Rule .1949

- 1. BCHS receives an application for the proposed daily flow.
- 2. BCHS staff reviews the application to determine the design daily flow.
  - a. Staff approves the design daily flow or;
  - b. Requests OSWP Engineer guidance.
- 3. Receive a letter from the OSWP Engineer
  - a. An approval of the proposed design daily flow;
  - b. A request for revisions to the proposed daily design flow that includes:
    - a) A section detailing any required revisions with citation of the applicable statute or rule;
    - b) A section detailing any suggested or recommended revisions based upon current knowledge base (guidance, manuals, or standards of practice);
  - c. A request for additional information that includes:
    - a) A section detailing any required additional information with citations to rules or statutes and;
    - b) A section detailing any suggested or recommended additional information based upon current knowledge base (guidance, manuals, or standards of practice).
- 4. If the proposed daily design is not approved and the required revisions and/or additional information identified by OSWP Engineer is submitted, then the proposal is reviewed again.
- 5. If the proposed daily design is not approved and the Submitting Party declines to make the required revisions and/or provide the required additional information that the OSWP engineer has identified, the Submitting Party may request an Informal Internal Review.

B. Design plans and specifications pursuant to Rule .1938(f). *(This is typically an engineered design that does not specifically require State review based on Design Flow <3,000 gpd. The depth and nature of State review for such projects will vary based on relative BCHS needs.)*

1. Receive an Application:

1. BCHS Staff performs a soil/site evaluation
2. BCHS Staff sends a report to the applicant with system specifications/parameters requiring plan submittal.
3. Receives Plans from a PE
  - a. BCHS Staff reviews and approves plans or;
  - b. Request for OSWP engineer staff for review.

C. Design plans and specifications pursuant to Rule .1948(d); (*Proposals intended to overcome an UNSUITABLE classification*)

1. BCHS receives an application
2. BCHS staff reviews application
3. BCHS staff performs a soil and site evaluation.
4. BCHS staff denies the application for an on-site wastewater system.
5. Receives a soil study report prepared by a LSS.
6. BCHS Soil Scientist reviews the report and request OSWP staff review
7. Assist the State with processes outlined in Part 1A, Section II.C of the State Report

D. Design plans and specification for flow reduction utilizing low-flow fixtures or low-flow technologies pursuant to Session Law 2013-413 or 2014-120.

1. Receive application
2. Conduct Review
3. Provide a response to the Submitting Party
  - a. An approval of the system engineering plans and specifications, or
  - b. A request for revisions (reference Part 1A Section II 3 b (a) and (b))
  - c. A request for additional information (reference Part 1A Section II 3 c (a) and (b))

## **Part 1B: Food Protection and Facilities: Standardize Certain Regulatory Review Procedures**

*Reference Session Law 2014-120, Section 29.(b).*

Background: The Food Protection and Facilities Branch (FPF) reviews plan submittals for prototype food establishments to be franchised in multiple counties. Local environmental health staff acting as authorized agents of the Department review individual food establishment plans. Plans for construction of public swimming pools are also reviewed by local health department staff acting as agents of the Department with technical assistance from the FPF staff. Plan review checklists are used to assure uniform review for compliance with the rules.

- A. A Food Service Plan Review Application form and guidance are provided to assure all needed information is in order for approval.
- B. A public Swimming Pool Plan Review Checklist is used to check pool plans to assure all safety requirements and circulation system components are able to meet the water quality requirements.

**Part 2A: On-site Water Protection Informal Internal Review Processes  
and  
Procedures to Develop and Maintain a List of Review Engineers**

*Reference Session Law 2014-120, Section 29.(c).*

The following definitions apply throughout this document:

- A. Practice of Engineering. – As defined in G.S. 89C-3.
- B. Professional Engineer (PE). – As defined in G.S. 89C-3.
- C. Regulatory Authority. – The Department of Environment and Natural Resources, the Department of Health and Human Services, and any unit of local government operating a program (i) that grants permits, licenses, or approvals to the public and (ii) that is either approved by or delegated authority from the Department of Environment and Natural Resources or the Department of Health and Human Services.
- D. Regulatory Submittal. – An application or other submittal to a Regulatory Authority for a permit, license, or approval. In the case of a unit of local government, Regulatory Submittal shall mean an application or submittal submitted to a program approved by or delegated authority from the Department of Environment and Natural Resources or the Department of Health and Human Services.
- E. Submitting Party. – The person submitting the Regulatory Submittal to the Regulatory Authority.

Scope:

This guidance is applicable to Regulatory Submittals prepared, sealed and signed by a professional engineer licensed pursuant to Chapter 89C of the General Statutes. These Regulatory Submittals are reviewed by either the On-Site Water Protection Branch (OSWP) or BCHS environmental health staff acting under delegated authority.

This department does not maintain a qualified Professional Engineer (PE) on staff, and so does not employ specific local procedures for informal internal review of On-site Water Protection submittals filed by a PE. Instead, this department requests qualified OWSP staff to assist with such submittals.

I. Procedures for possible scenarios.

- A. If a Submitting Party requests an Informal Internal Review of an engineered design by this department, the request will be forwarded to the OWSP Engineer in accordance with Part 2A Section III of the States Report.
- B. A list of PEs available for Informal Internal Reviews will be developed by the state in accordance with Part 2A Section III of the State Report.

**Part 2B: Food Protection and Facilities Informal Internal Review Processes  
and**

**Procedures to Develop and Maintain a List of Review Engineers**

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- D. Regulatory Submittal. – An application or other submittal to a Regulatory Authority for a permit, license, or approval. In the case of a unit of local government, Regulatory Submittal shall mean an application or submittal submitted to a program approved by or delegated authority from the Department of Environment and Natural Resources or the Department of Health and Human Services.
- E. Submitting Party. – The person submitting the Regulatory Submittal to the Regulatory Authority.

This department does not maintain a qualified Professional Engineer (PE) on staff, and so does not employ specific local procedures for informal internal review of Food Protection Facility Branch (FPF) submittals filed by a PE. Instead, this department requests qualified FPF staff to assist with such submittals.

**I. Procedures for possible scenarios.**

- A. If a Submitting Party requests an Informal Internal Review of an engineered design by this department, the request will be forwarded to the FPF Engineer in accordance with Part 2B Section III of the States Report.
- B. A list of PEs available for Informal Internal Reviews will be developed by the state in accordance with Part 2B Section III of the State Report.

### **Part 3A: Onsite Water Protection Review of Working Job Titles**

*Reference Session Law 2014-120, Section 29.(h).*

Review the Working Job Titles of every employee with job duties that include the review of Regulatory Submittals

- A. Environmental Health Director
- B. Environmental Health Soil Scientist
- C. Environmental Health Program Specialist
- D. Environmental Health Specialist II
- E. Environmental Health Specialist

Brunswick County Environmental Health has no working titles with the term “Engineer” included. None of those position descriptions require that employees be licensed PE.



### **Part 3B: Food Protection and Facilities Review of Working Job Titles**

*Reference Session Law 2014-120, Section 29.(h).*

Review the Working Job Titles of every employee with job duties that include the review of Regulatory Submittals

- A. Environmental Health Director
- B. Environmental Health Program Specialist
- C. Environmental Health Specialist II
- D. Environmental Health Specialist

Brunswick County Environmental Health has no working titles with the term “Engineer” included. None of those position descriptions require that employees be licensed PE.



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## Appendix 1

Request for Water Protection Branch, Environmental Health Section of NC Department of Public Health Review:

**BCHS File # 2015-72131:** County evaluated the property and determine the site to be unsuitable for an on-site wastewater system. November 15, 2015 informal review request was received by BCHS Environmental Health Section. State as reviewed the property. County is waiting for State report.

**BCHS File # 2010-70527:** County repaired the wastewater system for this property March 23, 2010. July 15, 2013 this office received another repair application, current repair system was malfunctioning. County worked with the individual by make several visits to the property trying to resolve issue. October 4, 2013 owner stated the system was working properly. April 16, 2015 property owner submitted another repair application. County requested state review. The state reviewed the property and submitted a report with findings. The owner submitted a statement to this office informing the county that the wastewater system is no longer malfunctioning. The county confirmed the system status.

**BCHS File # 2014-71813:** County identified this property to be unsuitable. The owner decided to install drainage and monitor the seasonal high water table December 2014 – April 2015. A soil consultant submitted a report June of 2015 verifying the seasonal high water table did meet the minimum requirements. The county submitted the report to the State for assistance. A permit was issued August 14, 2015.

**BCHS File # 2015-71940:** County determine a horizontal setback requirement from an existing private drinking water supply. The consultant disagreed with the outcome. The County requested the state's private drinking water staff for interpretation.

**BCHS File # 1993-31542:** The house placement could not be located on the property according to local rules (planning and zoning) and meet the horizontal setback required from the existing private drinking water well. Owner requested for State review. State review confirmed local decision because the existing well did not appear to be grouted and no well log was on record. The owner applied for a new private drinking water well to be installed on the property and the old well was abandon properly.